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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/724,161

12/01/2003

Kyung-Eun Lee

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7590

11/03/2009

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WASHINGTON,, DC 20036

EXAMINER

RABOVIANSKI, JIVKA A

ART UNIT

PAPER NUMBER

2426

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PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/724,161	<b>Applicant(s)</b> LEE ET AL.	
	<b>Examiner</b> JIVKA RABOVIANSKI	<b>Art Unit</b> 2426	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 17 August 2009.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1 – 14 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1 – 14 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 01 December 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 08/17/2009 has been entered.

### ***Status of Claims***

2. Claims 1 – 14 are pending

Claims 15 - 24 are cancelled.

Claims 1 and 9 have been amended.

### ***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**4. Claims 1 - 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Leporini (USPPGPubN 2003/0110382, referred to as Leporini), and further in view of Kitazato (USPN 6966065, referred to as Kitazato).**

**Regarding claims 1 and 9:**

Leporini teaches: A hybrid digital broadcasting (Leporini, [0179]; EN: the hybrid fiber coax (HFC) network) receiver for reproducing digital multimedia data, comprising:

Leporini teaches: a broadcast receiving module comprising (Leporini, Fig. 4/ receiver/decoder 2000):

Leporini teaches: a receiving section for receiving and demodulating a digital broadcasting data stream which includes a multiplexed and transmitted plurality of compressively encoded and scrambled programs (Leporini, [0003]; Fig. 4/ 2016, 2018, 2012 and 2014; EN: the "receiver/decoder" for receiving either encoded signal);

Leporini teaches: a first demultiplexer for demultiplexing said demodulated digital broadcasting data stream, and selecting and extracting digital broadcasting data corresponding to a program selected by a user (Leporini, Fig. 2000/ 2010; EN: demultiplexer for demultiplexing the

demodulated broadcasting data stream and extracting the data corresponding to remote control selection);

Leporini teaches: a conditional access section for detecting conditional access information and decrypting said selected digital broadcasting data using said detected information; and a decoder module comprising (Leporini, [0176], [0263], Fig. 4 and 10; EN: the scrambled content are all delivered independently to a receiver/decoder, from a first party, second party and third party – Fig. 10/2052; the scrambled data and encrypted control word are then received by the receiver/decoder having access to an equivalent to the exploitation key stored on a smartcard inserted in the receiver/decoder to decrypt the encrypted control word and thereafter descramble the transmitted data):

Leporini teaches, [0170], Fig. 4/ 2010, 2100, a coprocessor that is adapted to receive input data from various sources including a hard disc on which audiovisual and other data can be stored. Leporini fails to teach a second demultiplexer for demultiplexing a digital multimedia. However, Kitazato teaches, Fig. 12, C 2: L39 – L60, C17: L17 –L24, a second demultiplexer for demultiplexing music and still image data of the album, and outputs them to video audio decoders.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Leporini with the teaching of a second demultiplexer for demultiplexing media streams as further taught in Kitazato to meet all limitation in claim 1, in order to propose different services to television viewers.

Leporini teaches: a decoding section for decoding digital broadcasting data output from said broadcast receiving module and digital multimedia data output from said second demultiplexer (Leporini, Fig. 4; EN: the demux 2010 executes the operation of the first and the second demultiplexer- the decoding section is connected to the demux and 2004 that receives data from the hard disc).

Leporini teaches the first demultiplexer, but fails to teach the second demultiplexer for demultiplexing the digital multimedia. data. However, Kitazato teaches, Fig. 12, C 2: L39 – L60, C17: L17 – L24, a second demultiplexer for demultiplexing music and still image data of the album, and outputs them to video audio decoders. Kitazato teaches C17: L10 – L17, Fig. 12/ 82; EN: two demultiplexers respectively for filter conditions set by a DeMUX driver 82 of the CPU 80, the necessary transport packet is separated from the transport stream supplied from the descrambler, and a

second demultiplexer for demultiplexing music and still image data of the album, and outputs them to video audio decoders.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Leporini with the teaching of two demultiplexers for demultiplexing media streams as further taught in Kitazato to meet all limitation in claim 1, in order to propose different services to television viewers.

**Regarding claims 2 and 10:**

Leporini teaches: The hybrid digital broadcasting receiver according to claim 1, further comprising a smart card for receiving said conditional access information and generating a scrambling key (Leporini, Fig. 4, [0069]; EN: the processor is preferably adapted to utilize a master session key to generate an encryption/authentication key).

**Regarding claims 3 and 11:**

Leporini teaches: The hybrid digital broadcasting receiver according to claim 1, wherein said conditional access information comprises program management information and subscriber management information (Leporini, [0176], [0257], [0260]; EN: the processor may be adapted to encapsulate an encrypted data object in a further encrypted data object,

and furthermore may be adapted to encapsulate an Entitlement Control Message in a (Entitlement Management Message).

**Regarding claims 4 and 12:**

Leporini teaches: The hybrid digital broadcasting receiver according to claim 2, wherein said conditional access section receives said scrambling key from said smart card and decrypts said digital broadcasting data (Leporini, [0176]; EN: the scrambled data and encrypted control word are then received by the receiver/decoder 2000 having access to an equivalent to the exploitation key stored on a smartcard inserted in the receiver/decoder to decrypt the encrypted control word and thereafter descramble the transmitted data).

**Regarding claims 5 and 13:**

Leporini teaches, Fig. 4/ 2100, [0171]; EN: multimedia includes a combination of text, audio, still images, animation, video – the source of multimedia is hard disc that contains video, audio and image data; audiovisual and other data can be stored). Leporini fails to teach a second demultiplexer for demultiplexing a digital multimedia. However, Kitazato teaches, Fig. 12, C 2: L39 – L60, C17: L17 –L24, a second demultiplexer



for demultiplexing music and still image data of the album, and outputs them to video audio decoders.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Leporini with the teaching of a second demultiplexer for demultiplexing media streams as further taught in Kitazato to meet all limitation in claim 5, in order to propose different services to television viewers.

**Regarding claim 6:**

Leporini teaches: the hybrid digital broadcasting receiver according to claim 1, wherein said digital multimedia data comprises audio data and video data (Leporini, Fig. 4/ 2024 and 2026).

**Regarding claim 7:**

Leporini teaches: Fig. 4; EN: the demux 2010 separates the received signal into two signals audio and video – 2024 and 2026. Leporini fails to teach that the second demultiplexer does it. However, Kitazato teaches, Fig. 12/ 70, 54 and 55; EN: the second demux separates audio and video data.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Leporini with the teaching

of a second demultiplexer separates audio and video data as further taught in Kitazato to meet all limitation in claim 7.

**Regarding claims 8 and 14:**

Leporini teaches: the hybrid digital broadcasting receiver according to claim 1, wherein said broadcast receiving module and said decoder module are each formed in a single integrated circuit (Leporini, [0392], [0394], Fig. 7; EN: integrated circuits capable of performing the operations required in the receiver/decoder; where some components may be implemented by dedicated hardware).

***Examination Considerations***

5. The claims and only the claims form the metes and bounds of the invention. "Office personnel are to give the claims their broadest reasonable interpretation in light of the supporting disclosure. In re Morris, 127 F.3d 1048, 1054-55, 44USPQ2d 1023, 1027-28 (Fed. Cir. 1997). Limitations appearing in the specification but not recited in the claim are not read into the claim. In re Prater, 415 F.2d, 1393, 1404-05, 162 USPQ 541,550-551 (CCPA 1969)" (MPEP p 2100-8, c 2, I 45-48; p 2100-9, c 1, I 1-4). The Examiner has full latitude to interpret each claim in the broadest reasonable sense. Examiner will reference prior art using terminology

familiar to one of ordinary skill in the art. Such an approach is broad in concept and can be either explicit or implicit in meaning.

6. Examiner's Notes are provided with the cited references to prior art to assist the applicant to better understand the nature of the prior art, application of such prior art and, as appropriate, to further indicate other prior art that maybe applied in other office actions. Such comments are entirely consistent with the intent and spirit of compact prosecution. However, and unless otherwise stated, the Examiner's Notes are not prior art but a link to prior art that one of ordinary skill in the art would find inherently appropriate.

7. Unless otherwise annotated, Examiner's statements are to be interpreted in reference to that of one of ordinary skill in the art. Statements made in reference to the condition of the disclosure constitute, on the face of it, the basis and such would be obvious to one of ordinary skill in the art, establishing thereby an inherent prima facie statement.

8. Examiner's Opinion: paragraphs 5 - 7 apply. The Examiner has full latitude to interpret each claim in the broadest reasonable sense.

### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- Leporini, US Patent Publication 2003/0110382
- Kitazato, US Patent 6966065
- Ho, US Patent 6622307

### ***Contact***

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jivka Rabovianski whose telephone number is (571) 270-1845. The examiner can normally be reached on M-F 8:30-6:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, JOSEPH HIRL can be reached on (571) 272-3685. Customer Service can be reached at (571) 272-2600. The fax number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is

available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/Jivka Rabovianski/

October 28, 2009

/Joseph P. Hirl/

Supervisory Patent Examiner, Art Unit 2426

October 30, 2009